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<b>Exhibit R-2, RDT&amp;E Budget Item Justification:</b> PB 2013 Navy	<b>DATE:</b> February 2012
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APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMENCLATURE							
1319: <i>Research, Development, Test &amp; Evaluation, Navy</i> BA 5: <i>Development &amp; Demonstration (SDD)</i>				PE 0604703N: <i>Personnel, Trng, Sim, &amp; Human Factors</i>							
COST (\$ in Millions)	FY 2011	FY 2012	FY 2013 Base	FY 2013 OCO	FY 2013 Total	FY 2014	FY 2015	FY 2016	FY 2017	Cost To Complete	Total Cost
Total Program Element	10.098	12.992	7.348	-	7.348	7.514	7.669	7.793	7.926	Continuing	Continuing
1822: <i>Manpower Pers &amp; Human Fact System</i>	10.098	12.992	7.348	-	7.348	7.514	7.669	7.793	7.926	Continuing	Continuing

**A. Mission Description and Budget Item Justification**

This non-acquisition category program provides funds for continued (but less risky) R&D for broader application of advanced technologies to transition successful research proof-of-concept demonstrations into operational use. Development of prototype systems to support and/or improve operational requirements of manpower and personnel sponsors is the primary goal of this Engineering Development Program. The R&D Program features the use of a broad range of technologies from cognitive science, human systems integration, learning management, content management & delivery, learning and ability testing techniques, mathematical modeling and optimization, statistical and econometric forecasting, intelligent systems, data visualization, data mining, simulation, decision support systems, and new services oriented architectures to include applications, databases and communications configuration. This non-acquisition category program provides funds for continued R&D for broader application of advanced training technologies and the science of learning to transition successful research proof of concept demonstrations and rapid prototyping of Commercial off the Shelf/Government off the Shelf (COTS/GOTS) technologies into operational use.

<b>B. Program Change Summary (\$ in Millions)</b>	<b><u>FY 2011</u></b>	<b><u>FY 2012</u></b>	<b><u>FY 2013 Base</u></b>	<b><u>FY 2013 OCO</u></b>	<b><u>FY 2013 Total</u></b>
Previous President's Budget	10.759	12.992	8.758	-	8.758
Current President's Budget	10.098	12.992	7.348	-	7.348
Total Adjustments	-0.661	-	-1.410	-	-1.410
• Congressional General Reductions	-	-			
• Congressional Directed Reductions	-	-			
• Congressional Rescissions	-	-			
• Congressional Adds	-	-			
• Congressional Directed Transfers	-	-			
• Reprogrammings	-0.233	-			
• SBIR/STTR Transfer	-0.360	-			
• Program Adjustments	-	-	-1.410	-	-1.410
• Rate/Misc Adjustments	-	-	-	-	-
• Congressional General Reductions	-0.068	-	-	-	-
Adjustments					

**Change Summary Explanation**

Technical: Not applicable.

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Schedule: Not applicable.		

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Exhibit R-2A, RDT&E Project Justification: PB 2013 Navy									DATE: February 2012		
APPROPRIATION/BUDGET ACTIVITY 1319: Research, Development, Test & Evaluation, Navy BA 5: Development & Demonstration (SDD)				R-1 ITEM NOMENCLATURE PE 0604703N: Personnel, Trng, Sim, & Human Factors				PROJECT 1822: Manpower Pers & Human Fact System			
COST (\$ in Millions)	FY 2011	FY 2012	FY 2013 Base	FY 2013 OCO	FY 2013 Total	FY 2014	FY 2015	FY 2016	FY 2017	Cost To Complete	Total Cost
1822: Manpower Pers & Human Fact System	10.098	12.992	7.348	-	7.348	7.514	7.669	7.793	7.926	Continuing	Continuing
Quantity of RDT&E Articles	0	0	0	0	0	0	0	0	0		

## A. Mission Description and Budget Item Justification

L1822/Manpower, Personnel, Training, Sim, and Human Factors. This non-acquisition category program provides funds for continued R&D for broader application of advanced technologies to transition successful 6.3 research proof-of-concept demonstrations into operational use. Development of prototype systems to support and/or improve operational requirements of manpower and personnel sponsors is the primary goal of this Engineering Development Program. The 6.5 R&D Program features the use of a broad range of technologies from cognitive science and ability testing techniques, mathematical modeling and optimization, statistical and econometric forecasting, intelligent systems, data visualization, data mining, simulation, decision support systems, and new database and communications configuration.

## B. Accomplishments/Planned Programs (\$ in Millions, Article Quantities in Each)

	<b>FY 2011</b>	<b>FY 2012</b>	<b>FY 2013</b>
<b>Title:</b> Manpower Pers & Human Fact System	10.098	12.992	7.348
<b>Articles:</b>	11	9	6
<b>Description:</b> This program is funded under RDT&E operational systems development because it encompasses engineering and development of new end-items prior to production approval decision and the upgrading and enhancement of existing MPTE decision support systems, tools and models.			
<b>FY 2011 Accomplishments:</b> <ul style="list-style-type: none"> <li>- Continued transitioning of Future Naval Warfighter Capabilities (FNWC) Capable Manpower products.</li> <li>- Continued transitioning of Integrated System for Language Education and Training (ISLET).</li> <li>- Completed transitioning of Virtual Environment for Ship and Shore Experiential Learning (VESSEL).</li> <li>- Continued Training and Supply Chain Management Decision Support Systems integration and transition.</li> <li>- Continued Improved Manpower and Personnel Integration Tool.</li> <li>- Continued transition of Future Naval Warfighter Capabilities (FNWC) Capable Manpower (CM) Refresh of early prototypes.</li> <li>- Continued development of Training Capacity Tradeoff Model.</li> <li>- Continued enhancement of products delivered via World Class Modeling.</li> <li>- Continued transitioning of DARPA Digital Tutor to Center for Information Dominance for IT Training.</li> <li>- Transitioned RIDE/JOIN into PRIDE MOD.</li> </ul>			

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<b>Exhibit R-2A, RDT&amp;E Project Justification:</b> PB 2013 Navy		<b>DATE:</b> February 2012	
<b>APPROPRIATION/BUDGET ACTIVITY</b> 1319: <i>Research, Development, Test &amp; Evaluation, Navy</i> BA 5: <i>Development &amp; Demonstration (SDD)</i>	<b>R-1 ITEM NOMENCLATURE</b> PE 0604703N: <i>Personnel, Trng, Sim, &amp; Human Factors</i>	<b>PROJECT</b> 1822: <i>Manpower Pers &amp; Human Fact System</i>	
<b>B. Accomplishments/Planned Programs (\$ in Millions, Article Quantities in Each)</b>		<b>FY 2011</b>	<b>FY 2012</b>
<ul style="list-style-type: none"> <li>- Small Business Innovative Research (SBIR).</li> </ul> <b>FY 2012 Plans:</b> <ul style="list-style-type: none"> <li>- Complete transitioning of Future Naval Warfighter Capabilities (FNWC) Capable Manpower products.</li> <li>- Complete transition of Integrated System for Language Education and Training (ISLET).</li> <li>- Continue Training and Supply Chain Management Decision Support Systems integration and transition.</li> <li>- Continue Improved Manpower and Personnel Integration Tool.</li> <li>- Continue transition of Future Naval Warfighter Capabilities (FNWC) Capable Manpower (CM) Refresh of early prototypes.</li> <li>- Continue development of Training Capacity Tradeoff Model.</li> <li>- Continue enhancement of products delivered via World Class Modeling.</li> <li>- Complete transition of DARPA Digital Tutor to Center for Information Dominance for IT Training.</li> <li>- Start GFMDI implementation.</li> <li>- Small Business Innovative Research (SBIR).</li> </ul> <b>FY 2013 Plans:</b> <ul style="list-style-type: none"> <li>- Continue Training and Supply Chain Management Decision Support Systems integration and transition.</li> <li>- Continue Improved Manpower and Personnel Integration Tool.</li> <li>- Continue transition of Future Naval Warfighter Capabilities (FNWC) Capable Manpower (CM) Refresh of early prototypes.</li> <li>- Continue development of Training Capacity Tradeoff Model.</li> <li>- Continue enhancement of products delivered via World Class Modeling.</li> <li>- Small Business Innovative Research (SBIR).</li> </ul>			
<b>Accomplishments/Planned Programs Subtotals</b>		10.098	12.992
<b>C. Other Program Funding Summary (\$ in Millions)</b>			
N/A			
<b>D. Acquisition Strategy</b>			
N/A			
<b>E. Performance Metrics</b>			
<p>This PE provides funding to support the transition of models and decision support tools from RDT&amp;E funded research, Science and Technology (6.2-6.3), to production and into the hands of analysts and program managers throughout the Manpower, Personnel, Training and Education enterprise. The PE also supports the application of proven industry models, tools and methodologies to Navy MPTE problems where GOTS solutions are non-existent. One goal of this PE is to transition 90% of successful S&amp;T products to production and eventual use within the Navy. An acceptable metric will be to successfully transition 80% of the products. The second goal of the PE is to successfully implement 90% of the industry-standard tools that are attempted to be used in Navy applications.</p>			

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Exhibit R-3, RDT&E Project Cost Analysis: PB 2013 Navy											DATE: February 2012		
APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMENCLATURE				PROJECT					
1319: Research, Development, Test & Evaluation, Navy BA 5: Development & Demonstration (SDD)				PE 0604703N: Personnel, Trng, Sim, & Human Factors				1822: Manpower Pers & Human Fact System					
<b>Product Development (\$ in Millions)</b>				FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Software Development	C/IDIQ	Acuitus:Palo Alto, CA	4.800	-	Mar 2012	-		-		-	0.000	4.800	
<b>Subtotal</b>			4.800	-		-		-		-	0.000	4.800	
<b>Support (\$ in Millions)</b>				FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Development Support	Allot	NPRST:Millington, TN	2.200	1.650	Mar 2012	1.650	Mar 2013	-		1.650	Continuing	Continuing	Continuing
Development Support	Allot	CNP:Washington, DC	3.098	9.932	Mar 2012	5.698	Mar 2013	-		5.698	Continuing	Continuing	Continuing
Development Support	Allot	PMW-240:Various	-	1.410	Mar 2012	-		-		-	0.000	1.410	
<b>Subtotal</b>			5.298	12.992		7.348		-		7.348			
			Total Prior Years Cost	FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total		Cost To Complete	Target Value of Contract
<b>Project Cost Totals</b>			10.098	12.992		7.348		-		7.348			
<b>Remarks</b>													

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Exhibit R-4, RDT&E Schedule Profile: PB 2013 Navy		DATE: February 2012
APPROPRIATION/BUDGET ACTIVITY 1319: Research, Development, Test & Evaluation, Navy BA 5: Development & Demonstration (SDD)	R-1 ITEM NOMENCLATURE PE 0604703N: Personnel, Trng, Sim, & Human Factors	PROJECT 1822: Manpower Pers & Human Fact System

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<b>Exhibit R-4A, RDT&amp;E Schedule Details:</b> PB 2013 Navy			<b>DATE:</b> February 2012
<b>APPROPRIATION/BUDGET ACTIVITY</b> 1319: <i>Research, Development, Test &amp; Evaluation, Navy</i> BA 5: <i>Development &amp; Demonstration (SDD)</i>	<b>R-1 ITEM NOMENCLATURE</b> PE 0604703N: <i>Personnel, Trng, Sim, &amp; Human Factors</i>	<b>PROJECT</b> 1822: <i>Manpower Pers &amp; Human Fact System</i>	

**Schedule Details**

Events by Sub Project	Start		End	
	Quarter	Year	Quarter	Year
<b>Proj 1822</b>				
Future Naval Warfighter Capabilities (FNWC) Capable Manpower Products: Future Naval Warfighter Capabilities (FNWC) Capable Manpower Products	3	2011	4	2012
Future Naval Warfighter Capabilities (FNWC) Capable Manpower Products: FNWC 1	3	2011	3	2011
Future Naval Warfighter Capabilities (FNWC) Capable Manpower Products: FNWC 2	4	2011	4	2011
Future Naval Warfighter Capabilities (FNWC) Capable Manpower Products: FNWC 3	3	2012	3	2012
Future Naval Warfighter Capabilities (FNWC) Capable Manpower Products: FNWC4	4	2012	4	2012
Integrated System for Language Education and Training (ISLET): Integrated System for Language Education and Training (ISLET)	4	2011	4	2012
Integrated System for Language Education and Training (ISLET): ISLET 1	4	2011	4	2011
Integrated System for Language Education and Training (ISLET): ISLET 2	3	2012	3	2012
Integrated System for Language Education and Training (ISLET): ISLET 3	4	2012	4	2012
Virtual Environment for Ship and Shore Experiential Learning (VESSEL): Virtual Environment for Ship and Shore Experiential Learning (VESSEL)	1	2011	4	2011
Virtual Environment for Ship and Shore Experiential Learning (VESSEL): VESSEL	4	2011	4	2011
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: Training/Supply Chain Mgmt Decision Support Systems Integration/Transition	2	2011	4	2017
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS I	2	2011	2	2011
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS 2	4	2011	4	2011
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS 3	2	2012	2	2012

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APPROPRIATION/BUDGET ACTIVITY 1319: Research, Development, Test & Evaluation, Navy BA 5: Development & Demonstration (SDD)		R-1 ITEM NOMENCLATURE PE 0604703N: Personnel, Trng, Sim, & Human Factors		PROJECT 1822: Manpower Pers & Human Fact System	
		Start		End	
Events by Sub Project		Quarter	Year	Quarter	Year
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS 4		4	2012	4	2012
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS 5		2	2013	2	2013
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS 6		4	2013	4	2013
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS 7		2	2014	2	2014
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS 8		4	2014	4	2014
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS 9		2	2015	2	2015
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS 10		4	2015	4	2015
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS I1		2	2016	2	2016
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS I2		4	2016	4	2016
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS I3		2	2017	2	2017
Training/Supply Chain Mgmt Decision Support Systems Integration/Transition: T/SCMDS I4		4	2017	4	2017
Improved Manpower and Personnel Integration Tool: Improved Manpower and Personnel Integration Tool		3	2011	4	2016
Improved Manpower and Personnel Integration Tool: IMPI 1		3	2011	3	2011
Improved Manpower and Personnel Integration Tool: IMPI 2		4	2011	4	2011
Improved Manpower and Personnel Integration Tool: IMPI 3		3	2012	3	2012
Improved Manpower and Personnel Integration Tool: IMPI 4		4	2012	4	2012



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APPROPRIATION/BUDGET ACTIVITY 1319: Research, Development, Test & Evaluation, Navy BA 5: Development & Demonstration (SDD)		R-1 ITEM NOMENCLATURE PE 0604703N: Personnel, Trng, Sim, & Human Factors		PROJECT 1822: Manpower Pers & Human Fact System	
		Start		End	
Events by Sub Project		Quarter	Year	Quarter	Year
Improved Manpower and Personnel Integration Tool: IMPI 5		3	2013	3	2013
Improved Manpower and Personnel Integration Tool: IMPI 6		4	2013	4	2013
Improved Manpower and Personnel Integration Tool: IMPI 7		3	2014	3	2014
Improved Manpower and Personnel Integration Tool: IMPI 8		4	2014	4	2014
Improved Manpower and Personnel Integration Tool: IMPI 9		3	2015	3	2015
Improved Manpower and Personnel Integration Tool: IMPI 10		4	2015	4	2015
Improved Manpower and Personnel Integration Tool: IMPI 11		3	2016	3	2016
Improved Manpower and Personnel Integration Tool: IMPI 12		4	2016	4	2016
FNWC CM Refresh Early Prototypes: FNWC CM Refresh Early Prototypes		1	2011	4	2017
FNWC CM Refresh Early Prototypes: FNWC CM 1		1	2011	1	2011
FNWC CM Refresh Early Prototypes: FNWC CM 2		3	2011	3	2011
FNWC CM Refresh Early Prototypes: FNWC CM 3		4	2011	4	2011
FNWC CM Refresh Early Prototypes: FNWC CM 4		2	2012	2	2012
FNWC CM Refresh Early Prototypes: FNWC CM 5		4	2012	4	2012
FNWC CM Refresh Early Prototypes: FNWC CM 6		2	2013	2	2013
FNWC CM Refresh Early Prototypes: FNWC CM 7		4	2013	4	2013
FNWC CM Refresh Early Prototypes: FNWC CM 8		2	2014	2	2014
FNWC CM Refresh Early Prototypes: FNWC CM 9		4	2014	4	2014
FNWC CM Refresh Early Prototypes: FNWC CM 10		2	2015	2	2015
FNWC CM Refresh Early Prototypes: FNWC CM 11		4	2015	4	2015
FNWC CM Refresh Early Prototypes: FNWC CM 12		2	2016	2	2016
FNWC CM Refresh Early Prototypes: FNWC CM 13		4	2016	4	2016
FNWC CM Refresh Early Prototypes: FNWC CM 14		2	2017	2	2017
FNWC CM Refresh Early Prototypes: FNWC CM 15		4	2017	4	2017
Training Capacity Tradeoff Model: Training Capacity Tradeoff Model		2	2011	4	2017

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APPROPRIATION/BUDGET ACTIVITY 1319: Research, Development, Test & Evaluation, Navy BA 5: Development & Demonstration (SDD)		R-1 ITEM NOMENCLATURE PE 0604703N: Personnel, Trng, Sim, & Human Factors		PROJECT 1822: Manpower Pers & Human Fact System
		Start		End
Events by Sub Project		Quarter	Year	Quarter Year
Training Capacity Tradeoff Model: TCTM 1		2	2011	2 2011
Training Capacity Tradeoff Model: TCTM 2		4	2011	4 2011
Training Capacity Tradeoff Model: TCTM 3		2	2012	2 2012
Training Capacity Tradeoff Model: TCTM 4		4	2012	4 2012
Training Capacity Tradeoff Model: TCTM 6		2	2013	2 2013
Training Capacity Tradeoff Model: TCTM 7		4	2013	4 2013
Training Capacity Tradeoff Model: TCTM 8		2	2014	2 2014
Training Capacity Tradeoff Model: TCTM 9		4	2014	4 2014
Training Capacity Tradeoff Model: TCTM 10		2	2015	2 2015
Training Capacity Tradeoff Model: TCTM 11		4	2015	4 2015
Training Capacity Tradeoff Model: TCTM 12		2	2016	2 2016
Training Capacity Tradeoff Model: TCTM 13		4	2016	4 2016
Training Capacity Tradeoff Model: TCTM 14		2	2017	2 2017
Training Capacity Tradeoff Model: TCTM 15		4	2017	4 2017
WCM Enhancements: WCM Enhancements		2	2011	4 2017
WCM Enhancements: WCM 1		2	2011	2 2011
WCM Enhancements: WCM 2		4	2011	4 2011
WCM Enhancements: WCM 3		2	2012	2 2012
WCM Enhancements: WCM 4		4	2012	4 2012
WCM Enhancements: WCM 5		2	2013	2 2013
WCM Enhancements: WCM 6		4	2013	4 2013
WCM Enhancements: WCM 7		2	2014	2 2014
WCM Enhancements: WCM 8		4	2014	4 2014
WCM Enhancements: WCM9		2	2015	2 2015
WCM Enhancements: WCM 10		4	2015	4 2015

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